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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/005,052	12/04/2001	Adelmo Monsalve-Gonzalez	5553 9205	
30173 7: GENERAL MIL		EXAMINER		
P.O. BOX 1113	•	TRAN LIEN, THUY		
MINNEAPOLIS, MN 55440			ART UNIT	PAPER NUMBER
			1761	
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SHORTENED STATUTORY	PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE	
2 MONTUS		02/05/2007	PAPER	

Please find below and/or attached an Office communication concerning this application or proceeding.

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

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	Application No.	Applicant(s)				
	10/005,052	MONSALVE-GONZALEZ ET AL.				
Office Action Summary	Examiner	Art Unit				
	Lien T. Tran	1761 .				
The MAILING DATE of this communication appears on the cover sheet with the correspondence address Period for Reply						
A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION. - Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication. - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication. - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).						
Status						
1) Responsive to communication(s) filed on <u>01 November 2006</u> .						
2a)☐ This action is FINAL 2b)☒ This	action is non-final.					
3) Since this application is in condition for allowance except for formal matters, prosecution as to the men						
closed in accordance with the practice under E	x parte Quayle, 1935 C.D. 11, 45	3 O.G. 213.				
Disposition of Claims						
4) Claim(s) 1-3 and 5-48 is/are pending in the app	olication.					
4a) Of the above claim(s) is/are withdraw	n from consideration.					
5) Claim(s) is/are allowed.						
6) Claim(s) <u>1-3 and 5-48</u> is/are rejected.						
7) Claim(s) is/are objected to.						
8) Claim(s) are subject to restriction and/or	election requirement.					
Application Papers		•				
9) The specification is objected to by the Examiner.						
10)☐ The drawing(s) filed on is/are: a)☐ acce	epted or b) \square objected to by the E	Examiner.				
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).						
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).						
11) The oath or declaration is objected to by the Ex	aminer. Note the attached Office	Action or form PTO-152.				
Priority under 35 U.S.C. § 119		•				
12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).						
a) ☐ All b) ☐ Some * c) ☐ None of:		·				
1. ☐ Certified copies of the priority documents						
2. Certified copies of the priority documents	• •					
 Copies of the certified copies of the prior application from the International Bureau 	•	d in this National Stage				
	, , , ,	d				
* See the attached detailed Office action for a list of the certified copies not received.						
Attachment(s)						
Notice of References Cited (PTO-892) 4) ☐ Interview Summary (PTO-413)						
Paper No(s)/Mail Date						
B) Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date	5) Notice of Informal P 6) Other:	atent Application .				

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Claims 1-3, 5-9, 16-48 are rejected under 35 U.S.C. 103(a) as being unpatentable over Stanley (4844924) in view of Phillips et al

Stanley discloses a method of preparing a bran product. The method comprises the steps of reacting the bran with lower aliphatic carboxylic acid, acid halide, ester or anhydride and bleaching the reacted bran with one or more bleaching agents. The agents used are peroxides, chlorites, peracids and ozone. Following breaching, the bleached bran is isolated from the bleaching medium by filtration, centrifugation etc, washed and dried to form a free-flowing particulate. (see columns 1,3-4 and example 5). The pH is adjusted to an acidic level after the esterifying step and before the bleaching step. Example 5 discloses adjusting the ph to 5 before bleaching. This meets the limitation of acidifying the bran to a pH of about 4-6 prior to treating with ozone.

The teaching of Stanley is described above. Stanley does not disclose the bran is wheat bran or red wheat bran, the size of the bran is about 100 microns, the acid as in claims 16-17, the moisture content of the bran, the amount of ozone, admixing the bran with flour, forming a dry mix, forming cereal pieces, adding the bran to a grain product and forming the grain product into finished baked good.

Phillips et al disclose a process of bleaching lignocellulosic pulp using ozone.

They teach the amount of ozone used in the bleaching is .2-1% ozone (see col. 5 lines 34-38)

Stanley teaches bleaching bran with ozone; during bleaching, the bran reacts with the ozone. Thus, the reference meets the step of reacting bran with ozone.

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Stanley does not disclose the amount. In absence of showing of criticality or unexpected result, it would have been obvious to one skilled in the art to determine the amount of ozone to be used following the teaching of Phillips et al which shows amount in the range which cause bleaching to occur. Applicant has not shown any unexpected result with the claimed amount; it is only a conventional amount used in known reaction as shown by Phillips et al. The properties of reducing ferulic acid and increasing vanillin are an obvious result of the reaction of bran with ozone. Thus, such properties will also be found in the Stanley product. While Stanley discloses the preferred bran is corn bran, other material including vegetable, cereal and fruit sources can be used as the starting material. Therefore, it would have been obvious to one skilled in the art to use other type of bran when desiring to bleach such bran product. Stanley discloses bran of varying particle sizes; it would have been an obvious matter of choice to pick any size. The bran product disclosed by Stanley is a dietary fiber material having improved color stability. It would have been obvious to one skilled in the art to add the bran product to any food product including dry mix, cereal, grain product, baked goods etc...when one desires to increase the fiber content of that product. Stanley discloses adding the bran to dough for bread, crackers, cookies and biscuits. If the bran can be added to the dough, it can be added to the flour which is used to make the dough. The use of whole wheat flour or regular wheat flour would have been an obvious matter of choice. It would also have been obvious to add the bran to grain product and cereal product because these food products are typical made to have a high fiber content. The addition of the bran will serve such purpose. The making of cereal pieces is well known

in the art; thus, the steps of making the cereal pieces would have been readily apparent to one skilled in the art. It would also have been obvious to use grain product to prepare baked good because they are commonly prepared from grain product. The properties claimed are obviously found in the Stanley product because the bran is treated with ozone just as claimed. Applicant has not shown any unexpected result or criticality with the amount claimed. When the bran is added to whole wheat flour, it is obvious the pH will be the same as claimed because the same flour is used.

Claims 1-3,5-21,23-26,33-34,35-39,41,48 are rejected under 35 U.S.C. 102(e) as being anticipated by Gonzalez et al (Wo 02/21936A2)

Wo 02/21936 discloses a bleached bran and methods of preparation. The starting material for the bleaching can be any type of wheat such as white wheat or red wheat. The bran can be any suitable particle size such as 100 microns or more. The process comprises the steps of treating the bran with about .02-.1% chelating agent for about 1-15 minutes at a temperature of about 70-90 degree c, washing and rinsing the bran, filtering the bran, blanching the bran for 3-10 minutes at 75-85 degree C, washing and rinsing the blanched bran and reacting the bran with oxidant substances such as hydrogen peroxide, ozone. The moisture content of the bleached bran is 4-12%. The whiteness of the bleached bran is further improved by treating the bran with .1-2% ozone at pH 4-5. The anti-oxidant activity is increased up to 30-35% and the ferulic acid is reduced. The bleached bran can be recombined with flours. The bran can be put into dry mixes, ready-to-eat cereals, refrigerated uncooked or bakeable dough, cooked

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cereal dough. The chelating agents used are selected from the ones listed on page 7 lines 25-29. (see pages 6-10,12-13,16,18)

The reference discloses the limitations of the above cited claimed. The claimed language does not exclude the additional steps disclosed in the patent. The reference teaches the ozone is used in amount of .1-2% at acidic pH of 4-5. The properties of the reduced ferulic acid and increased vanillin are inherent in the product disclosed in the patent. Since the treatment with ozone is not done under reduced or increased pressure, it is inherent the process takes place at atmospheric pressure.

Claims 22,27-32,40,42-47 are rejected under 35 U.S.C. 103(a) as being unpatentable over WO 02/21936A2.

Gonzalez et al do not disclose dissolving organic acid in water, forming cereal pieces such as puffed and flakes, the amount of bran added, the pH of the product, mixing wheat flour with sugar, salt and leavening, the product is baked good.

It would have been obvious to one skill in the art to determine how to dissolve the acid to have the proper pH. This determination would have been well within the skill of one in the art. The making of cereal pieces is well known in the art; thus, the steps of making the cereal pieces would have been readily apparent to one skilled in the art. It would also have been obvious to use grain product to prepare baked good because they are commonly prepared from grain product. It would have been obvious to add any amount of the bran product depending on the type of product made, the texture, flavor, taste and nutrition desired. It would also have been obvious to vary the pH depending on the type of product. This is well within the determination of one in the art.

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It would have been obvious to mix flour with sugar, salt and leavening when making the product using flour and the bran mixture.

Applicant's arguments with respect to claims 1-3, 5-48 have been considered but are most in view of the new ground(s) of rejection.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Lien T. Tran whose telephone number is 571-272-1408. The examiner can normally be reached on Monday, Wed-Thursday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Cano Milton can be reached on 571-272-1398. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

February 1, 2007

LIENTRAN
FRIMARY EXAMINER

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